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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/880,191	06/13/2001	Hideo Katoh	M2115-3	6154
7278	7590	11/15/2004	EXAMINER	
DARBY & DARBY P.C. P. O. BOX 5257 NEW YORK, NY 10150-5257			AGDEPPA, HECTOR A	
			ART UNIT	PAPER NUMBER
			2642	

DATE MAILED: 11/15/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/880,191

Applicant(s)

KATOH, HIDEO

Examiner

Hector A. Agdeppa

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 13 June 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1 and 7-16 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1, 7-16 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 13 June 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 6/13/2001.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Claim Objections***

1. Claim 1 is objected to because of the following informalities: In the first preliminary amendment, applicant canceled claims 2 – 6. In the second preliminary amendment, applicant added new claims 7 – 16. However, claim 7 is merely a duplicate of claim 1. Examiner believes applicant meant to cancel claim 1 in the first preliminary amendment. For the purposes of examination, examiner will address claims 1 and 7 – 16, although appropriate correction is required.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1, 7 - 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over US 5,966,776 (Ona) in view of applicant's admitted prior art.

As to claims 7 and 11 Ona teaches a hinge device for rotating a first member transmitter 3, read as the claimed transmitting section, and a second member phone body 2, read as the claimed receiving section. (Abstract, Figs. 5 – 14, Col. 7, line 43 – Col. 12, line 36 of Ona) Ona further teaches a stationary cam 21 read as the claims fixed cam, a shaft 23, a movable cam 24 read as the claimed cam slider, rotatable and slidable in a direction of the rotation axis and inherently shaft 23, movement of movable

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cam 24 being arrested by shaft 23, and a coil spring 27 read as the claimed compression spring. (Col. 7, lines 43 – 55 of Ona) Note that Ona teaches holes 33, 34, and 35 in members 2 and 3 disposed on one end of shaft 23. Moreover, Ona teaches a flange 26 and a ring 25 wherein spring 27 is interposed between movable cam 24 and both flange 26 and ring 25. Therefore, either the holes or flange and/or ring read on the claimed arresting body. (Figs., 5, 7, 9, 11, and 13 of Ona)

What Ona does not specifically teach is a case body with baffle means.

However, the above-mentioned holes act as a case body enclosing the aforementioned elements. Alternatively, it would have been obvious for one of ordinary skill in the art at the time the invention was made to have used a separate case body in the invention of Ona inasmuch as some enclosure for the above-mentioned elements is necessary. Such elements cannot be left in the open. Moreover, as discussed by applicant on page 1 of the specification for the present invention, hinge devices using a case body with baffle means are known, conventional art. Baffles merely create a space for air to enter or escape thus improving certain operations. Because such is known and conventional, the motivation for using baffle means could also be applicable to Ona, thereby making it obvious for one of ordinary skill in the art at the time the invention was made to have used a case body with baffle means in the invention of Ona. Ona seeks to improve hinge means and such would further that goal by again, known and conventional means.

Also, Ona does not specifically teach the order or exact orientation of the above-mentioned elements. However, such would be an obvious design choice because the

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above-mentioned elements work in conjunction with each other to effect the same functionality as that claimed by the present invention. Moreover, whether or not the claimed arresting body for example was located on one end of the shaft of the other, it would still operate. In other words, the claimed elements as a whole could be “flipped over” 180 degrees and the orientation would then be like that taught by Ona.

As to claim 8, as discussed above, the holes 33, 34, and 35 are merely cavities wherein the above-discussed element are inserted in held. Therefore Ona teaches that stationary cam 21 is independent of any case body or enclosure. Moreover, Ona teaches that the stationary cam's rotation is arrested while in body 2. (Col. 7, line 65 – Col. 8, line 6 of Ona)

As to claims 9 and 10, see Figs. 15 and 16, Col. 8, lines 36 – Col. 9, line 44 and Col. 10, lines 16 – 22, Col. 11, line 48 – Col. 12, line 25 of Ona.

3. Claims 12 - 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over US 5,966,776 (Ona) in view of applicant's admitted prior art, and further in view of US 6,065,187 (Mischenko).

As to claims 12 and 16, see the rejection of claim 7. What Ona does not teach is the use of a slider washer. However, the use of slider washers is extremely old and well known in the mechanical arts. It is old and well known to use washers to effect easier or smoother movement, again, not just in the telephony arts, but in any mechanical, building, or construction means. Therefore, again, because Ona seeks to improve hinged movement, it would have been obvious for one of ordinary skill in the art at the

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time the invention was made to have used a washer. Moreover, use of a washer would not teach away from Ona inasmuch as the above-discussed orientation of elements would allow for the use of a washer. Finally, use a washer is merely a design choice offering extra smoothness of operation. As seen by claims 7 and 12, the washer is not critical to operation of the present invention either as claim 7 does not claim the washer.

Also, Mischenko teaches the use of slider washers 2808 and 2810 in a hinge assembly for a wireless communication device. (Figs. 1 – 5, Col. 4, lines 14 – 28 of Mischenko) It would have been obvious for one of ordinary skill in the art at the time the invention was made to have used at least one washer in the invention of Ona, because as noted by Mischenko, washers can help prevent the wear and tear on contacting elements during their use. (Col. 4, lines 24 – 28 of Mischenko) Because Ona teaches contacting members like Mischenko, it would have been advantageous to use such washers in Ona as well.

As to claim 13, see the rejection of claim 8.

As to claims 14 and 15, see the rejection of claims 9 and 10.

### ***Conclusion***

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. US 5,697,124 (Jung) teaches a hinge mechanism for foldable electronic apparatus. US 5,923,751 (Ohtsuka et al.) teaches an opening and closing device for a portable telephone. US 6,115,620 (Colonna et al.) teaches a mode-

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switchable portable communications device using hinge means. US 6,115,886 (Fujita) teaches a hinge apparatus. US 6,175,990 (Kato et al.) teaches a hinge device.

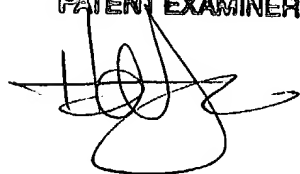
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hector A. Agdeppa whose telephone number is 703-305-1844. The examiner can normally be reached on Mon thru Fri 9:30am - 6:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ahmad F. Matar can be reached on 703-305-4731. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

H.A.A.  
November 2, 2004

HECTOR A. AGDEPPA  
PATENT EXAMINER

A handwritten signature in black ink, appearing to be 'H.A. Agdeppa', written over the printed name and title.